PREAWARD CONFERENCE QUESTION AND ANSWERS Be-300 Interior

What items in the performance work statement does the AVN consider to rise to the level of an STC?

ANSWER--The modification required in the performance work statement will need approved data to be able to return the aircraft to service by the vendor. The method of acquiring an approved data package should be part of the certification plan to be submitted by potential vendors and could include STC, field approval or other means acceptable to the Administrator.

Per item 1.3.4., are seat belts included with the seats?

ANSWER-- The seat frames will come with seat belts.

Appendix A; Item 1.1.1---Will the aircraft be certified in an "Experimental Category" for purpose of research and development for flight testing purposes?

ANSWER—The aircraft will have a standard airworthiness certificate.

Is the contract asking for an FAA STC Approval for the acoustic/thermal insulation kit?

ANSWER-- We expect to be provided an approved data package for the complete modification. The certification plan should specify how the contractor expects to meet this requirement and return the aircraft to service at the completion of the modification.

Appendix A, Item 1.1.1 (4)---Is there an OSHA report or guidelines for noise comparison with and without soundproofing in aircraft?

ANSWER—Specific guideline not known. .Criteria is based on OSHA noise exposure and hearing conservation programs for a workplace, not specifically an aircraft.

Appendix A, Item 1.1.2---Is there a pre-approved acoustic/thermal insulation kit for this model aircraft by an STC or MFG's service bulletin?

ANSWER- Unknown. Vendor shall propose solution.

Appendix A, Item 1.2.1---New LED lighting will be installed in cockpit headliner. Is the new LED lighting a different type than previously installed subsequently requiring new switching and possibly power supply?

ANSWER-- Reference FAA Aircraft Manuals for legacy aircraft configuration. The legacy installation is an incandescent bulb.

Appendix A, Item 1.3.4---Do the mission specialist and observer seats have to meet 14 CFR Part 25.853 (c)/Part 135 requirements?

ANSWFR-- ANSWER: Yes--

Appendix A, Item 1.3.12---Will designing a transition cover strip and seal to eliminate the pinch hazard and seal the gaps on the flight inspection racks deviate from the FAA/AVN STC?

ANSWER—Per 1.3.12, "...The Contractor shall identify/design and deliver material for a transition cover strip and seal to eliminate the pinch hazard and seal the gaps...". FAA/AVN will include this material in the FAA/AVN STC.

Since the Q&A will not be answered until up to seven days after the conference is there a new due date going to be issued for the Proposal?

ANSWER— Right now the contracting officer (CO) does not expect the date will be extended. We are attempting to answer questions submitted in response to the SIR as we receive them. The compiled questions will be addressed at the conference. We will also take written questions (generated from the conference) and attempt to answer them if we can. The results of the conference will be posted to the website.

CO will attempt to get you answers as soon as possible. If there is a change to the requirement the SIR will be amended. Additional time may be determined appropriate at that time.

For the Acoustic Test flights and to meet the acoustic requirements could you please provide the spectrum that will be evaluated as well as the one to be used for the analysis?

ANSWER-- Reference Appendix A, Items 1.1.1 and 1.1.2. Additional details to be developed in the test plan per Item 1.1.1. Criteria are based on OSHA noise exposure and hearing conservation programs for a workplace, not specifically an aircraft.

Could the flight conditions, power settings, airspeeds and altitudes, fuel on board, maneuvers and duration that will be required for the analysis as well as the actual flights be provided?

ANSWER--Reference Appendix A -1.1.1 and 1.1.2. Requested flight details to be developed in the test plan per Paragraph 1.1.1.

Are there certain limitations or guidelines to be provided for instrumentation to measure the level of acoustic reduction?

ANSWER-- Since the criteria is based on OSHA noise exposure and hearing conservation programs for a workplace, not specifically an aircraft, it is recommended that measurements

be taken at the seat locations at seated head height. Details are to be agreed upon during formulation of the joint test plan per Appendix A, Item 1.1.1. Also, see change to PWS, Chapter 11, Acoustic Analysis, for qualified Aeronautical Acoustical Engineer requirements.

Is the analysis a stand alone dataset or does it have to be verified by flight test?

ANSWER— Unclear because the analysis shall document the in-flight test acoustic frequency profile to be used to tailor design the acoustic attenuating insulation. Expect the Vendor to want to establish a baseline and validate the acoustic attenuating insulation design by flight test. Final reduction criteria per Appendix A, Item 1.1.2 will be verified by flight test (see Appendix A, Item 1.1.1.(1).(a) and 1.1.1.(3).

If there is required instrumentation or is it to be provided and are their power limitations as well as airworthy limitations

ANSWER— The vendor is to provide all instrumentation for collecting this data. The proposed instrumentation of the aircraft provided by the vendor will be the deciding factor on airworthiness limitations that may be imposed. The instrumentation should be configured to not interfere with the crew or aircraft systems.

Contract Terms: After initial approval are subsequent installations basically Task Order Efforts?

ANSWER-- When a design is coordinated/approved it is then subject to the certificate approval of the prototype. Any additional aircraft refurb will be requested by delivery order IAW the certificate approval (all aircraft should be the same).

When we provide the 8110 and 8130 is the aircraft returned to service in a transport Category, or experimental.

ANSWER—The aircraft is to be returned to service in the Normal Category.

Appendix A-1.1.1 Is flight test to be made without frakes?

ANSWER— No. Flight test will be made without Frake's exhaust stacks on the Prototype or subsequent aircraft delivered for refurbishment. Per Appendix A-1.1.1, "All aircraft, to include the prototype aircraft, will be delivered to the Contractor for Interior Enhancement with Frake's Aviation Exhaust Stacks installed." Only the Legacy aircraft will be flight tested without Frake's exhaust stacks per Appendix A-1.1.1.(1).

If so, who will remove them as aircraft is to be delivered with frakes installed?

ANSWER— Not Applicable.

Appendix A 1.3.11—Is this an existing STC or is the contractor to obtain one?

ANSWER— As outlined in Appendix A-1.3.11, the FAA/AVN STC identifies and authorizes for installation all components to include wiring, microphone jack, headphone jack, and escutcheon. The Vendor is responsible for designing and installing the escutcheon into the new cabin interior. Then the Vendor will install the microphone and headphone jacks into the escutcheon and complete the wiring authorized per the FAA/AVN STC.

Appendix A-1.3.5.1 & 1.3.5.2—Are LED lights replacing a different Type?

ANSWER—Yes. Reference FAA Aircraft Manuals for legacy aircraft configuration. At a minimum, incandescent bulbs and fluorescent light tubes are being replaced.

Appendix A-1.3.5.1 & 1.3.5.2——— Is new switching required?

Answer-- Unknown. Vendor shall propose solution.

Appendix A 1.3.6--- New Oxygen box not called out for mission specialist position?

Answer-- Per Appendix A-1.3.6, "The Flight Crew will continue to use the original diluter-demand masks and FAA/AVN design has provided a diluter-demand mask at the Mission Specialist station." For clarification FAA/AVN has installed this diluter-demand mask at the Mission Specialist position; therefore, no addition oxygen (box) is needed.

Is lavatory seat belted/Passenger during taxi-takeoff-landing-flight?

Answer-- Yes. To be included in Appendix A -1.3.7 Lavatory Area refurbishment is the requirement to re-web seat belts and shoulder harness retaining the existing hardware.

Contract Issues:

"One time-up front purchases" Difference in language between the PWS and the Solicitation. Is there a specific CLIN line item?

Answer: See SIR amendment 002- CLIN 4.0 page 4a2.

"Payment Terms" Solicitation states "payment upon completion for Prototype. Also page 61 it states that payment for prototype will be paid after all documentation is complete.

Answer—See Amended Schedule B- CLIN 4.0—Milestone payments based on Preliminary Design Review and Critical Design Review and Final submittal of approved data package.

Solicitation page 47—What defines "best value" to the FAA?

Answer—See Section L and M. All of Section M.

What is the qualification for the Acoustical Analysis to be done under the SIR?

Answer: See PWS Paragraph 11 as amended.

Performance Work Statement Change:

See Paragraph 11.

- 11.0 ACOUSTIC ANALYSIS—Ref Tech Spec Appendix A—Paragraph 1.1.1 Acoustic Analysis
- (a) The contractor shall be responsible for the in-flight Acoustic Engineering Analysis in accordance with a test plan (CDRL A005 submittal). The contractor shall provide instrumentation and personnel to conduct in-flight Acoustic Engineering Analysis. This analysis shall document the acoustic frequency profile before and after Interior Enhancement (with soundproofing), and shall be used to tailor design the acoustic attenuating insulation. Test flight shall be flown by FAA AVN Pilot(s). This shall include in-flight frequency analysis for a minimum of four (4) different aircraft flights as follows:
 - (1) Present Operational Fleet Aircraft With:
 - a. Flight Inspection equipment turned off
 - b. Flight inspection equipment turned on
 - (2) Operational Fleet Aircraft with Frake's Aviation Exhaust Stacks installed by FAA:
- (3) Aircraft after Interior Enhancement and soundproofing without Flight Inspection equipment:
- (4) Aircraft after Interior Enhancement and soundproofing with all FAA installed Flight Inspection equipment operational. Additional in-flight frequency analysis flight may be conducted, as needed.

(ADDED)

(b) The Acoustic Engineering Analysis shall be accomplished by an aeronautical acoustic engineer knowledgeable in current industry standards for noise/acoustic abatement in aeronautical application (inside the aircraft cabin) and provide independent verification of results by a Certified Industrial Hygienist in accordance with OSHA ACGIH-PLV, with copy of results provided to the FAA. (Independent, meaning not employed full time by the contracted Vendor). The Vendor shall submit in their proposal information to validate the qualifications of the aeronautical acoustic engineer to include, but not limited to, the person/company and all professional certifications such as membership to "The Institute of Noise Control Engineering".